

### WFO Jackson Emergency Response





"Although the Weather Service hasn't predicted rain, certain indicators can't be ignored."

#### Dan Byrd WFO Jackson, MS





- What were we thinking at JAN....
- Wanted to better serve our customers...
- How could we do that?



- How about taking the weather to them!!
- So we looked at....



#### Incident Meteorologists

- Provide on-site weather forecasts and briefings for national Incidents
- Specially trained to work closely with customers
- Experienced with Incident Command System
- Dispatched nationally to support USFS, FEMA, Coast Guard etc.
- Cost a lot
- Not new





### **Local On-site Support**



- Tailored after the IMET.
- New service for when public safety is at risk for a significant length of time.
- NWS Jackson can send a meteorologist to the location to support an operation.
- This service is free to the county that requests the support.



#### So What!



What types of incidents could we support?

There are Plenty!!





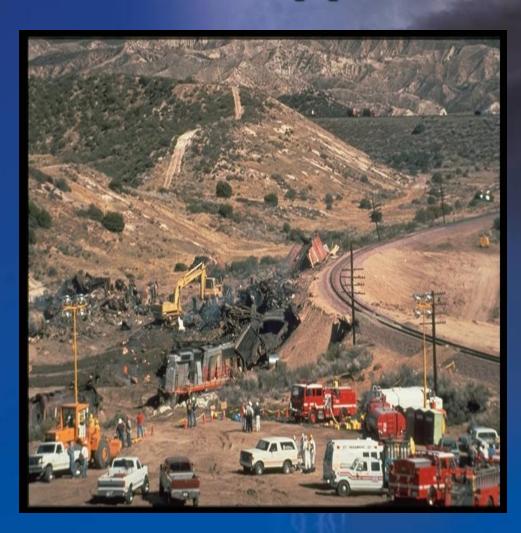


- Significant Hazmat or Terrorist activity
- Wind information important for evacuations

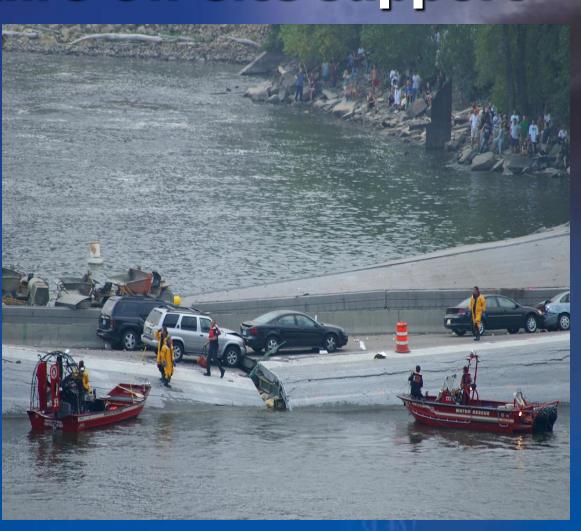


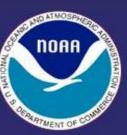
Obviously an IMET would be called for this large of a support...but an IRMET Could be used if it was smaller in scale.

- TrainDerailments
- May involve chemicals and evacuations
- Wind and rain information important



- BridgeCollapses
- Are there storms expected?
- River Levels
- Hypothermia?





#### Types of Incidents that might require On-site support – **Tornado recovery**









#### Greensburg residents find a city gone, a



#### Survivors tell of narrow escapes, unlikely discoveries







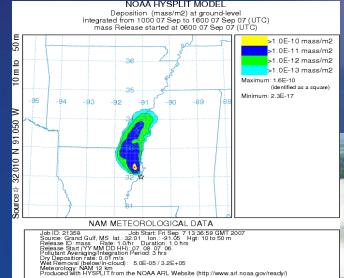






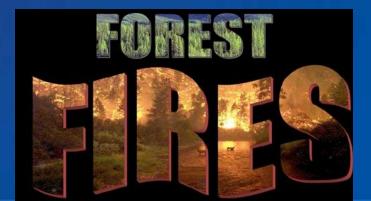


- Nuclear power plant meltdowns
- Can provide deposition and concentration
- Rain and wind will affect impact



**Three Mile Island** 

- Possible support during smaller forest fires or large prescribed burns.
- Continue to have discussions with the local forest FMO's about deploying an IRMET with local Type III teams.
- IMET normally not dispatched with Type III teams...but weather is still important.





#### **Exercises**



- Helps build relationships for the real event
- Allows us to demonstrate our capabilities
- Helps us learn what the needs are





#### **Process**



- Needed to figure out what equipment we needed and how much it would cost.
- Purchase a trailer, generator?
- What about communications in areas with no cell coverage
- Overnight stays...Hotel?
- This was going to be costly, budget couldn't support this.



#### Started with:



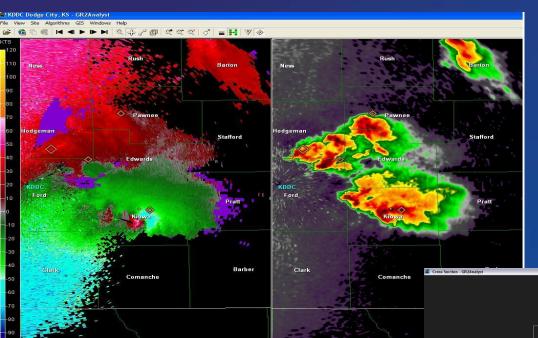
- Laptop with Wireless Internet capability
- Printer
- Dedicated cell phone
- Software including FXnet, GR2Analyst, Cameo, Hysplit and IEM Chat.
- Observing equipment (MK III Sensor Assembly). Data can be displayed on the laptop up to 400 feet away.
  Generator will be available.





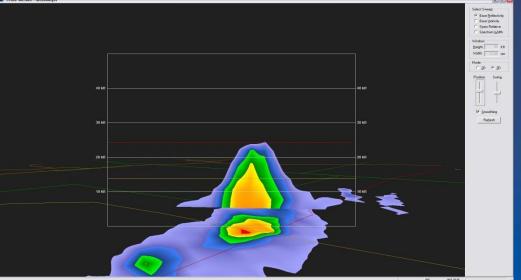
#### **GR2Analyst Software**





**Greensburg Tornado** 

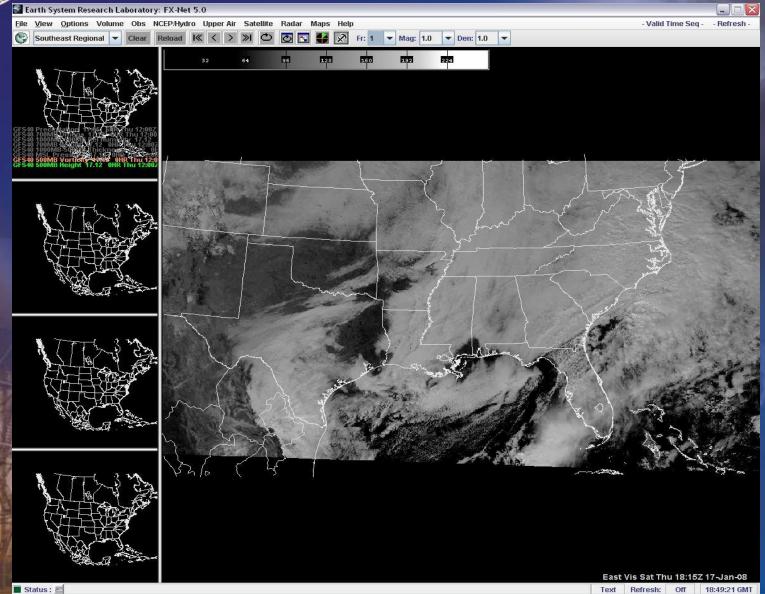
**Smoke Plume in Montana** 





#### **FX-Net Software**







#### **Observing Equipment**



MK III Sensor Assembly





#### So how do we provide On-site support?



- Don't always have cell or Wireless PC card coverage
- The key is to have reliable internet service no matter where we are
- This can not always be done by relying on the county to provide internet service or by depending solely on a wireless card
- To provide CWA wide support without restrictions and to keep costs low...we need something better and that's were the partnerships come in!





## So...how do we keep costs low and what do we work out of?

Who do we partner with?



#### **Newton County**

Mobile Emergency Communication Operations (MECO)







#### **MECO Uses**



- For extended events
- Will have the ability to have communications (voice and internet via satellite) anywhere in our County Warning Area
- Will be available on location 24/7
- Comes with sleeping, shower facilities
- Can also use for storm surveys of significant tornado events
- We have an agreement with the Newton County EM for the use of this (when available)



#### Latest addition



WFO Jackson Emergency Response Trailer...





#### **Emergency Response Trailer**



- Used for exercises and shorter duration events(or when MECO is unavailable on longer duration events)
- Can be used as a staging point for tornado surveys.
- Wireless internet capability(Need cell coverage)
- Heated and Cooled
- Dedicated Generator
- Also can be used for sleeping.



# On-site support in which NWS Jackson has participated



- 2 Terrorist/Hazmat exercises
- Grand Gulf Nuclear Power Plant exercise
- Hurricane Zora exercise
- 2 years running...Sturgis Motorcycle Rally

   provided on-site support for large
   gathering of people
- 1 Day Support for Hattiesburg Train
   Accident
- Naval Meridian air show in March 2008
- Madison County/Nissan plant tornado exercise.



#### Sturgis





- Complex setup
  - MECO setup adjacent to Oktibbeha County EM/911 comms center
    - Easy access to dispatchers and other officials
  - Newton County "mules" provided transportation around complex



### Madison County Exercise

Nov 08



F3 Tornado hitting Nissan plant









#### Costs to the WFO



- Observing equipment: Approx \$1200.00
- Laptop: Approx \$1800.00 (Can use existing one to keep costs lower)
- Wireless card: Approx \$50.00 per month
- Pay as you go cell phone.
- Trailer was donated by the ET Staff and was equipped at a relatively low cost.
- Costs are relatively low do to Partnerships.
  e.g. Newton County MECO



#### **Current status**



- Currently we have approx 3 to 4 forecasters interested in providing this support.
- Approximately half of the office has had ICS 100-200 training.
- Everything is in place to provide support.
- More training exercises are needed.
- Have talked with most of the EM's and will be participating in several activities this year.



#### **Continuing Challenges**



- Getting the word out
  - -One on one with the EM.
  - -LEPC talks
  - -EM Workshops
  - -MEMA Conference



- EM doesn't think to ask for support
  - Currently have procedures in place on what to do if there is a HAZMET incident.
  - -Provide initial support, then refer incident calls to either the WCM or myself.



#### **Upcoming activities**



List is growing fast

- Feb 12th Lowndes County -Tornado exercise with Columbus Air Force base.
- May 12<sup>th</sup> Hurricane Wendy Statewide hurricane exercise.
- Late May Copiah County Missing person exercise
- June 10<sup>th</sup> Jefferson Davis County Tornado table top exercise.
- Early Summer Covington County Chemical spill exercise
- August 18<sup>th</sup> 20<sup>th</sup> Jones County Williams Gas Pipeline Burst and Pinebelt Airport.
- September 9<sup>th</sup> Grand Gulf Nuclear power plant exercise.
- A few others with no firm date as of this time...



#### **Future Endeavors**



- Will attend training to teach ICS 100, 200 and 300.
- Continue to work with EM's on future activities.
- The key is to get in on the planning meetings, which sometimes are a year in advance.
- Will also continue to tailor our Response trailer to our needs.



#### **Local On-Site Summary**

- We can give data that may improve response to any situation
- Improve worker and public safety
- Improve decision making process
- Free to the customer





#### Questions?



